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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/930,208	08/16/2001	Osamu Itou	H6810.0028/P028	9208

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EXAMINER

SEFER, AHMED N

ART UNIT PAPER NUMBER

2826

DATE MAILED: 01/21/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b> 09/930,208	<b>Applicant(s)</b> ITOU ET AL.	
	<b>Examiner</b> A. Sefer	<b>Art Unit</b> 2826	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 01 December 2003.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-54 is/are pending in the application.
- 4a) Of the above claim(s) 5, 7-24, 26, 27, 32, 34-51, 53 and 54 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-4, 6, 25, 28-31, 33 and 52 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. §§ 119 and 120**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☒ All    b) ☐ Some \*    c) ☐ None of:  
1. ☒ Certified copies of the priority documents have been received.  
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  
\* See the attached detailed Office action for a list of the certified copies not received.
- 13) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application) since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.  
a) ☐ The translation of the foreign language provisional application has been received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121 since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.

**Attachment(s)**

- |   |   |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)                             | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____  |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                    | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____ | 6) <input type="checkbox"/> Other: _____                                    |

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## **DETAILED ACTION**

### ***Election/Restrictions***

1. Applicant's election without traverse of Embodiment 1 (claims 1-4, 6, 25, 28-31, 33 and 52) is acknowledged.

### ***Claim Rejections - 35 USC § 112***

2. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

3. Claims 1, 25, 28 and 52 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The limitation "wherein a product of said height of said recess and projection and a birefringence ..." recited in the claim is not understood.

Claims 1, 25, 28 and 52 recite the limitation "said height". There is insufficient antecedent basis for this limitation in the claims.

### ***Claim Rejections - 35 USC § 102***

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(c) the invention was described in-

(1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effect under this subsection of a national application published under section 122(b) only if the international application designating the United States was published under Article 21(2)(a) of such treaty in the English language; or

(2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that a patent shall not be deemed filed in the United States for the purposes of this subsection based on the filing of an international application filed under the treaty defined in section 351(a).

5. Claims 1-4, 6, 28 as understood, are rejected under 35 U.S.C. 102(e) as being anticipated by Okamoto et al. US PG-Pub 2002/0063826.

Okamoto et al. discloses (see fig. 13, par. 0162 and par. 0177) a liquid crystal display device comprising: an upper substrate 34 and a lower substrate 33 disposed in a mutually facing relation; a liquid crystal layer 20 sandwiched between said upper substrate and said lower substrate having a twist angle which falls within the range recited in the claim; a light diffusive reflective electrode 36 having recesses and projections provided on said lower substrate; a phase plate 28 provided on an outer surface of said upper substrate; a polarizing plate 29 provided on an outer surface of said phase plate.

As to the said product of said height of said recesses and projections and a birefringence, or the polarizing plate having an absorption axis azimuth recited in claim 6, the specification contains no disclosure of either the critical nature of the claimed arrangement or any unexpected results arising therefrom. Where patentability is said to be based upon particular chosen dimensions or upon another variable recited in a claim, the applicant must show that the chosen dimensions are critical. In re Woodruff, 919 F.2d 1575, 1578, 16 USPQ2d 1934, 1936 (Fed. Cir. 1990).

As for claim 2, Okamoto et al. discloses (see par. 0249) a liquid crystal layer having a retardation which falls within the range recited in the claim.

As for claim 3, Okamoto et al. discloses (see par. 0157) a phase plate having a retardation which falls within the range recited in the claim.

As for claim 4, Okamoto et al. discloses (see par. 0039) phase plate having a slow axis azimuth which falls within the range recited in the claim.

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6. Claims 28-31, 33 and 52, as understood, are rejected under 35 U.S.C. 102(e) as being anticipated by Okamoto et al. US PG-Pub 2002/0063826.

Okamoto et al. discloses (see fig. 13, par. 0162 and par. 0177) a method of fabricating a liquid crystal display device comprising the steps of: providing an upper substrate 34 and a lower substrate 33 disposed in a mutually facing relation; providing a liquid crystal layer 20 sandwiched between said upper substrate and said lower substrate having a twist angle which falls within the range recited in the claim; providing a light diffusive reflective electrode 36 having recesses and projections provided on said lower substrate; providing a phase plate 28 provided on an outer surface of said upper substrate; providing a polarizing plate 29 provided on an outer surface of said phase plate.

As to the said product of said height of said recesses and projections and a birefringence, or the polarizing plate having an absorption axis azimuth recited in claim 33, the specification contains no disclosure of either the critical nature of the claimed arrangement or any unexpected results arising therefrom. Where patentability is said to be based upon particular chosen dimensions or upon another variable recited in a claim, the applicant must show that the chosen dimensions are critical. In re Woodruff, 919 F.2d 1575, 1578, 16 USPQ2d 1934, 1936 (Fed. Cir. 1990).

As for claim 29, Okamoto et al. discloses (see par. 0249) a liquid crystal layer having a retardation which falls within the range recited in the claim.

As for claim 30, Okamoto et al. discloses (see par. 0157) a phase plate having a retardation which falls within the range recited in the claim.

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As for claim 31, Okamoto et al. discloses (see par. 0039) phase plate having a slow axis azimuth which falls within the range recited in the claim.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to A. Sefer whose telephone number is (703) 605-1227.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Nathan Flynn can be reached on (703) 308-6601

ANS  
January 11, 2004

A handwritten signature in black ink, consisting of several fluid, overlapping strokes that form a stylized, somewhat abstract shape.